

REMARKS:

The foregoing amendments canceled claims 19-21. In addition, claim 1 was amended by further defining that the magnetic alloy has an intrinsic coercive force (iHc) of 7 kOe or higher, along the lines described on page 12, lines 20-25 of the present specification disclosure. New claims 26-31 were added to the application. Independent claims 26 and 29 also define that the magnetic alloy has an intrinsic coercive force (iHc) of 7 kOe or higher. Independent claims 26 and 29 define that the magnetic alloy contains at least one of Ce and Co. Support for the magnetic alloy containing at least one of Ce and Co can be found in the present specification disclosure in the paragraph bridging pages 9 and 10, the first complete paragraph on page 10, Examples 11-15 on pages 28-32, and elsewhere. The lower limits for Ce and Co are contained in No. 1 on page 32 and No. 38 on page 29, respectively, and elsewhere. Independent claim 29 further defines that the magnetic alloy contains  $M^2$  that is selected from the group consisting of Si, Nb, Ti, Ga, Al, Ta, and C. Support for  $M^2$  can be found in the present specification disclosure on page 9, lines 3-11, Examples 14 and 15 on pages 31 and 32, and elsewhere.

The foregoing amendments clarify what was already implied in applicant's claims and these amendments are not narrowing amendments and were not made for reasons substantially related to patentability presented. Consideration and allowance of claims 1, 7, 14, and 26-31 are respectfully requested.

Claims 1, 7, 14, and 19-21 were rejected under 35 U.S.C. §103(a) over the teachings of U.S. Patent No. 5,916,376 of Fukuno *et al.* (Fukuno). Claims 1, 7, 14, and 19-21 were also rejected under 35 U.S.C. §102(b)/35 U.S.C. §103 (a) over the teachings of U.S. Patent No.

5,395,459 of Pinkerton *et al.* (Pinkerton). Applicant (Takahiko IRIYAMA *et al.*) respectfully submits that the inventions set forth in claims 1, 7, 14, and 26-31 are patently distinguishable from the teachings of Fukuno or Pinkerton within the meaning of 35 U.S.C. §102(b) or 35 U.S.C. §103(a) for at least the following reasons.

The teachings of Fukuno require the presence of zirconium (Zr), which element is not included in and, in fact, is excluded from the magnet material of independent claims 1, 26, and 29. Therefore, applicant respectfully submits that the inventions defined in claims 1, 26, and 29 , as well as the claims that depend thereon, are patently distinguishable from the teachings of Fukuno within the meaning of 35 U.S.C. §103.

The Official action stated that the lower limits of 7.1 Sm in present claim 1 is substantially the same as the 7.0 at.% Sm proposed in Example 105 of Fukuno, and therefore, claim 1 would have been obvious over Example 105 of Fukuno. The Official action cited the cases of *Titanium Metals v. Banner*, 227 USPQ 733 (Fed. Cir. 1985) and *In re Peterson*, 65 USPQ2d 1379 (Fed. Cir. 2003). Applicant respectfully submits that the cases of *Titanium Metals* and *Peterson* are not controlling in the present factual situation for the reasons set forth in the response filed on October 17, 2006, which reasons are incorporated herein by reference.

The teachings of Fukuno state that Example 105 has a very low coercive force of 0.8 kOe. On the other hand, in the foregoing amendments, claim 1 was amended by further defining that *the magnet alloy has an intrinsic coercive force (iHc) of 7kOe or higher*. Thus, the presently claimed magnet alloy has a coercive force that is nearly tenfold that of Example 105 of Fukuno. Since the coercive force of the presently claimed magnet powder is vastly superior and

unexpectedly superior to that for Example 105 of Fukuno, the presently claimed invention cannot be obvious over such teachings. For similar reasons, applicant respectfully submits that claims 29 and 33, which also require that *the magnet alloy has an intrinsic coercive force (iHc) of 7 kOe or higher*, are also patently distinguishable from the teachings of Fukuno.

Applicant respectfully notes that the teachings of Fukuno require the precipitation of  $\alpha$ -Fe, while the presently claimed invention does not. This could be a reason why the coercive force of Example 105 of Fukuno is significantly lower than that required in present claims 1, 26, and 29.

Independent claims 26 and 29 require the presence of at least one of cesium (Ce) and cobalt (Co) in the presently claimed magnet material. The teachings of Fukuno do not contemplate or suggest the presence of Ce and/or Co in the magnet proposed therein without the presence of zirconium (Zr), the latter of which is not included in and, in fact, is excluded from the magnet material of independent claims 1, 26, and 29. Therefore, applicant respectfully submits that the inventions that defined in claims 1, 26, and 29, as well as the claims that depend thereon, are patently distinguishable from the teachings of Fukuno within the meaning of 35 U.S.C. §103.

With respect to the teachings of Pinkerton, applicant can find no concrete composition disclosed therein of a magnet alloy having specific amounts of Sm, Fe and N as required in present claim 1. For example, how much nitrogen (N) is proposed by the teachings of Pinkerton. Therefore, applicant respectfully submits that the inventions defined in claim 1 and the claims that depend thereon are patently distinguishable from the teachings of Pinkerton.

Similarly, applicant can find no concrete composition disclosed in Pinkerton of a magnet alloy having specific amounts of Sm, Ce, Fe, Co and N as required in present claims 26 and 29. Therefore, applicant respectfully submits that the inventions defined in claims 26 and 29 and the claims that depend thereon are patently distinguishable from the teachings of Pinkerton.

In other words, the teachings of Pinkerton do not contemplate or suggest a concrete composition of the magnet alloy having specific amounts of Sm, Fe and N as required in present claim 1 or specific amounts of Sm, Ce, Fe, Co and N as required in present claims 26 and 29. Furthermore, the teachings of Pinkerton do not contemplate or suggest a concrete composition of the magnet alloy having specific amounts of elements as required in present claim 1, 26, and 29 that *also has a high coercive force (iHc) of 7 kOe or higher*.

The Official action stated that Pinkerton teaches a Sm-Fe-N powdered magnetic material having the  $\text{TuCu}_7$  crystal structure, as well as the presently claimed thickness. Applicant respectfully submits that any comments concerning the  $\text{TuCu}_7$  crystal structure in Pinkerton are speculation and do not establish that the material proposed therein has such a structure. For example, the discussion at a column 6, lines 30-44 of Pinkerton, which is the only discussion concerning a  $\text{TuCu}_7$  crystal structure that the applicant can find in these teachings, explains that the diffraction pattern in FIGS. 3(a) and 3(b) could be either rhombohedral  $\text{Th}_2\text{Zn}_7$  or disordered hexagon  $\text{TuCu}_7$ , but not necessarily one or the other. Accordingly, applicant respectfully submits that the teachings of Pinkerton do not disclose or suggest a magnet material having the  $\text{TuCu}_7$  crystal structure, as presently claimed.

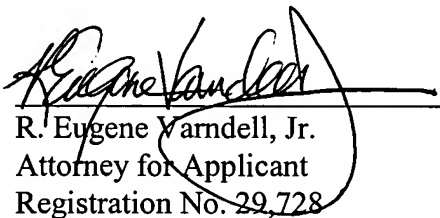
At least for the foregoing reasons, applicant respectfully submits that the inventions

defined in claims 1, 7, 14, and 26-31 are patently distinguishable from the teachings of Fukuno and/or Pinkerton. Therefore, applicant respectfully requests that the examiner reconsider and withdraw this rejection.

In view of the foregoing amendments and remarks, favorable consideration and a formal allowance of claims 1, 7, 14, and 26-31 are respectfully requested. While it is believed that the present response places the application in condition for allowance, should the examiner have any comments or questions, it is respectfully requested that the undersigned be telephoned at the below listed number to resolved any outstanding issues. .

In the event this paper is not timely filed, applicant hereby petitions for an appropriate extension of time. The fee therefor, as well as any other fees which may become due, may be charged to our deposit account No. 50-1147.

Respectfully submitted,  
POSZ LAW GROUP, PLC



R. Eugene Varndell, Jr.  
Attorney for Applicant  
Registration No. 29,728

Atty. docket No. VX012307A  
12040 South Lakes Drive  
Suite 101  
Reston, Virginia 20191  
(703) 707-9110

\\Q:\2006 PLUS\SUGA\VX012307A\OA 3.8.07\PO60-2307A RESP 9.6.07.DOC